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Monthly Statistical Report

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SUMMARY

Total deliveries' decline moderated in November from October's large, roughly 5 percent drop. However, deliveries still fell 2.6 percent for the month in response to the higher prices of recent months and a weakening economy. Deliveries of most major products continued to fall except for those of kerosine jet fuel, which reached record levels for this time of year.

Refinery activity paralleled demand patterns, with output of most products declining. Production of kerosine jet fuel, however, continued at record rates, rising 7 percent over last November.

Gasoline deliveries fell 3.2 percent, continuing the declines of recent prior months; distillate fuel oil deliveries, though stronger than might have been anticipated on the basis of the month's warmer weather, still declined 3.5 percent; deliveries of residual fuel oil fell nearly 22 percent to levels among the lowest in decades. Kerosine jet fuel deliveries, however, rose 4.5 percent, bringing their average year-to-year increase over the past four months to nearly 5 percent—contrasting with the roughly 1.5 percent decline for deliveries of all other products combined.

Imports fell, year to year, for the fourth month in a row—more so than not a reflection of the continued drawdown of domestic inventories. November's decline in imports amounted to 1.4 million B/D or nearly 17 percent, with both crude and products sharing in the decline.

With Alaskan production hampered by stormy weather at Valdez, domestic crude oil production fell roughly 450 thousand B/D or 6 percent for the month. Severe wind storms interfered with tanker loading, leading to closing of the Valdez port and substantially reduced pipeline flow on several brief occasions during the month. As a result, Alaskan production fell roughly 150 thousand B/D from the prior month's level and was down about 180 thousand B/D versus a year ago.

Total inventories dropped 27 million barrels during the month, bringing the drawdown since the end of July to about 65 million barrels. Distillate stocks declined 5 million barrels during the month but remained well above the levels of last November.

PRODUCT SUPPLIED [1]

Gasoline

DELIVERIES CONTINUE TO DROP. Retail gasoline prices, after rising about 30 cents per gallon between early summer and October, remained steady in November and even declined slightly towards the end of the month. The increase over the prior months was a partial reflection of volatile world crude oil prices which, through early November, had risen on net about $20 per barrel or more than 45 cents per gallon. By month-end, crude oil prices had fallen about $6 per barrel but were still over $13 (32 cents per gallon) above mid-June levels.

The impact of higher prices, however, continued to be evident. Deliveries in November continued to show larger declines year to year, falling 3.2 percent and suggesting that the 5 cent per gallon increase in the Federal excise tax—effective December 1—may not have spurred a noticeable amount of advance purchases before the new 14.1 cent per gallon Federal rate went into effect. Furthermore, travel data continue to show a slowing in vehicle traffic. Through July, the year-to-year growth in miles traveled had averaged about 3 percent. Data for September show only about a 1 percent increase, and there are indications that October may have declined.

Consumer response to higher prices of the past several months has also been evident in substantial grade switching away from premium unleaded, which nationally has averaged about 18 cents higher than midgrade. Department of Energy data for September show a year-to-year drop in sales of premium amounting to 27 percent. With premium's share falling from 22 percent to 17 percent between July and September, and likely more since then, downward shifts among the octane choices resulted in a net gain for unleaded regular, whose share rose to 69 percent from 63 percent over the same two-month period. Midgrade unleaded's share remained at about 10 percent, and that of regular leaded amounted to only 4-5 percent.

	API ESTIMATES NOVEMBER		YEAR-TO-DATE	
	Million B/D	Percent Change	Million B/D	Percent Change
Total domestic deliveries	16.9	(2.6)	16.9	(1.5)
Crude production[2]	7.1	(6.0)	7.2	(5.6)
Total imports[3]	6.9	(16.8)	8.1	0.3
Stocks (million bbl)[3]	1,060	(2.2)	na	na

Distillates

WARM WEATHER'S EFFECT NOT FULLY APPARENT.

Distillate deliveries, after falling in October by more than any likely decline in actual consumption, dropped 3.5 percent in November. With weather for the month 17 percent warmer than a year ago, the year-to-year decline was smaller than might have been expected. In fact, adjusted for weather, we estimate that deliveries for the month would have increased a little less than 1 percent. Although it is possible that this strength was the result of some buyers shifting purchases into November that otherwise might have occurred in December in order to avoid the 5-cent-per-gallon increase in Federal excise tax, this would be inconsistent with the apparent lack of such an effect on gasoline deliveries. With retail prices drifting downwards during the month, many purchasers may have concluded that there was little to gain from altering their purchase patterns.

Nevertheless, despite November's less-than-anticipated decline, the trend over the past several months has been downwards. Averaged over the past three months, distillate deliveries, adjusted for weather, would have declined about 1.5 percent.

Residual Fuel Oil

DELIVERIES STILL DOWN SUBSTANTIALLY.

Residual fuel deliveries fell 21.8 percent in November, a rate of decline close to the 17 percent seen on average during September and October. At 970 thousand B/D, deliveries remained below the million B/D mark for the third consecutive month and, as such, were among the lowest for any month in decades. Resid sales, more so than other petroleum products, have fallen in recent months. A significant part of resid's decline is attributable to higher prices and milder weather versus a year ago which have led utilities to switch to natural gas. These switches come on top of losses to nuclear power in New England and Mid-Atlantic states. Bunker markets also have been weak since August due to sharply lower petroleum imports and weakening foreign trade.

Continued mild weather in the East kept electricity demand flat in November. Heating degree days were off by more than 15 percent in high-resid-use states in New England and the Mid-Atlantic. The temperate weather and slack electricity growth are believed to have reduced resid demand by freeing up more economical supplies of natural gas ordinarily going to serve heating needs this time of year.

For electricity generation, resid and nuclear are not substitutes in the same sense as resid and natural gas. Nonetheless, increases in generation with one do come at the expense of the other in regions where both steam and nuclear capacities exist. As a result of significant additions to (and restoration of) nuclear capacity in the East over the past 15 months, there have been substantial drops in resid-fired generation there. While utility-specific data are not yet available for recent months, data from June show that for the three utilities in Pennsylvania, New Hampshire and Virginia with significant changes in nuclear status over the previous 12 months, consumption of petroleum fell by over 31 thousand B/D year-over-year. Net generation by these three companies increased by over 25 percent over that same period.

With burgeoning ocean-borne oil imports early this year, growth in bunker fuel demand had been strong prior to the invasion. However, declining petroleum imports (down nearly 2 million B/D since July) have tempered that growth. Weakness in bunker and utility markets (together accounting for about three-quarters of the resid market) comes on top of demand weakness elsewhere. These same two sectors, according to recently-released Energy Department data, had been responsible for resid's overall growth last year. Sales to other major sectors (commercial, industrial, oil company, military, and "all other") all saw declines.

Kerosine Jet Fuel

OTHER PRODUCTS DECLINE, BUT JET STAYS STRONG.

Jet fuel deliveries grew 4.5 percent in November, about the same rate they had grown on average since the August 2 Iraqi invasion of Kuwait. At nearly 1.4 million barrels/day, deliveries were the highest ever for any November and approached a record high for any month (second only to last December when jet fuel was blended with distillate for use as heating fuel). Growth in commercial airline travel contributed to the November deliveries growth as unprecedented flight discounts and incentives spurred travel demand. The deliveries increase came despite year-over-year declines in stateside military demand, estimated to be down about 10 thousand B/D (although up by a comparable amount against low levels in June and July of this year). The troop buildup in Saudi Arabia has left fewer planes at home, and thus, is believed to have translated into lower military jet fuel demand here.

Despite higher jet fuel prices, many airlines cut fares on already discounted travel and offered "free companion" tickets on restricted travel. The impact of these incentives, whose intent was to fill otherwise empty seats, provided a boost to passenger travel but likely had a smaller impact on aircraft miles flown. Full fare prices are estimated to be up 15-20 percent since July, but with the proliferation of discounts, average fares are up only about 6-8 percent. In assessing what happened to underlying fuel consumption, the impacts of higher overall fares, improved load factors, and a sluggish economy likely balanced the impact of heavy discounting. We estimate aircraft miles flown to have maintained growth in the 4-5 percent range during November.

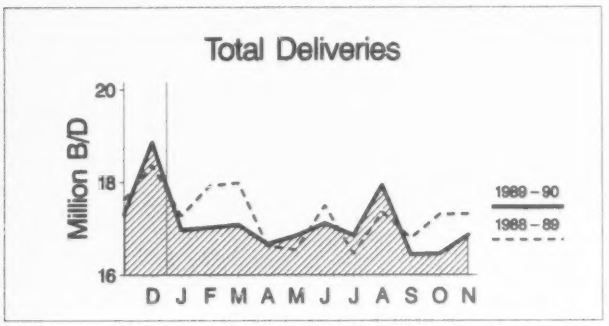
Spot jet fuel prices had risen sharply in the U.S. in September and early October (although the increases here were considerably lower than those in Europe and the Far East). However, by the end of November, increased jet fuel production and softer military demand brought jet fuel prices more in line with those of heating fuel.

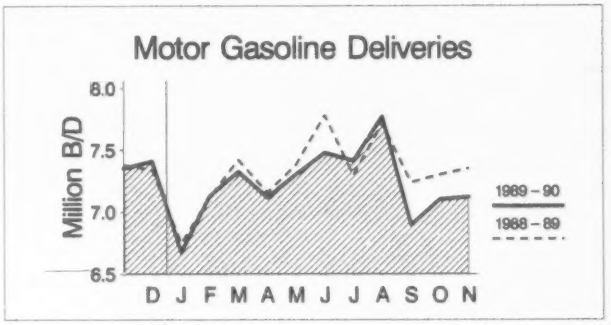
Other Oils

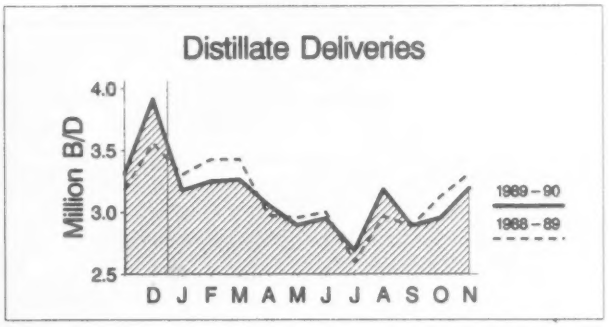
DELIVERIES NOT AS WEAK AS FOR TOTAL PRODUCTS.

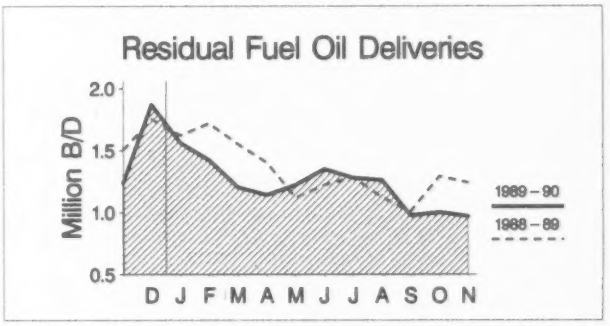
Deliveries of "other oils", reversing the declines of the past several months, rose 2.6 percent in November. Though, for the prior two years, deliveries in this category had been lagging behind the growth in total product deliveries, this has not been the case for much of this year. In 1988 and 1989, total deliveries had grown 3.7 percent and 0.2 percent, respectively, while growth in deliveries of "other oils" lagged behind by 1 to 1.5 percentage points.

Leaving aside the first quarter of this year, when extremely mild weather dampened heating demand for propane, deliveries of "other oils" have shown more strength than deliveries of petroleum products over all. Deliveries of "other oils" grew slightly faster than total deliveries in the second quarter, and since August, have risen an average of about 1.5 percent—contrasting with a decline of the same magnitude for total deliveries.









SUPPLY [1/]

Production

BAD WEATHER HAMPERS SHIPMENTS FROM NORTH SLOPE. Several episodes of stormy weather at the Port of Valdez hampered loadings and thus slowed North Slope production in November. For several days early in the month, winds of up to 125 miles per hour hampered tanker traffic and led the Coast Guard to close the port of Valdez at times. The result was a reduction in pipeline flow to as little as 700 thousand B/D for brief periods. Another bout of high winds late in the month had a similar effect. The result was a 150 thousand B/D drop in Alaskan production from October's recent-month high. Because of recent production enhancements, the year-to-year decline under more normal conditions would have been much less than the 180 thousand B/D observed.

In the lower 48, production declined 275 thousand B/D or 4.9 percent, year to year. Without the weather-related disruption in Alaska, the decline for the U.S. as a whole would have been 4 percent, about a third less than earlier in the year. However, actual data for November show a drop of 454 thousand B/D or 6.0 percent.

Imports

YEAR-TO-YEAR DECLINE CONTINUES. November's imports fell, year to year, for the fourth month in a row. The 16.8 percent decline, when combined with those of the prior three months, put the average year-to-year drop since August at nearly 900 thousand B/D. Two thirds of that decline reflected a significant draw on domestic inventories over the past four months versus a smaller build during the same period last year.

Withdrawals from the Strategic Petroleum Reserve added about 110 thousand B/D, or less than 1 percent of refineries' crude runs for the month, to crude oil supplies during November. The roughly 4 million barrels in sales from the test ordered by President Bush in late September were nearly complete by month-end. The 26 shipments from the SPR since October amounted to a small fraction of the roughly 590 million barrels that have been accumulated over the past thirteen years at a rate of anywhere from 16 to 93 million barrels per year. In recent years, the SPR build has typically been 20 to 25 million barrels annually. (SPR withdrawals are reflected in the accompanying petroleum balance under "other supply". Imports for storage in the SPR are not included in API import data, which reflect commercial imports only.)

With weaker demand and adequate domestic supplies, product imports continued to be down year to year in November. Overall, product imports fell 14.7 percent or about 320 thousand B/D. Imports of finished gasoline dropped 121 thousand B/D to 285 thousand B/D, distillate imports fell 68 thousand B/D to about 239 thousand B/D, and residual fuel oil imports were down nearly 200 thousand B/D to 349 thousand B/D.

Though declining demand contributed to the drop in imports of most major products, this was not the case for kerosine jet fuel. November's kerosine jet fuel imports averaged 47 thousand

B/D for the month, down from 89 thousand B/D a year ago, despite deliveries which have continued to be strong in recent months. Rather, imports of this product have been dampened by strong demand outside the U.S., particularly from the military build-up in the Middle East. European spot prices in recent months have been averaging 10 to 15 cents per gallon higher than in New York, and the premium has been even greater in the Far East. With foreign prices continuing substantially higher than in the U.S., greater reliance has been placed on supplies from domestic refineries.

Refinery Operations

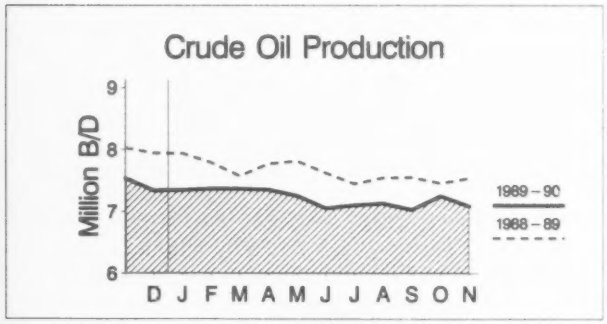
PRODUCT OUTPUT PARALLELS DEMAND. The drop-off in deliveries continued to be reflected in refinery activity in November, with input to distillation units falling by 3.3 percent, year to year. November's input was similar to October's lower level, which had followed strong activity during the July through September period. Product-by-product output paralleled demand patterns for the individual products. Gasoline output was off 2.1 percent, and distillate fuel oil, 5.1 percent; residual fuel oil output fell nearly 20 percent. Kerosine jet fuel production, however, was up 7.0 percent. Continuing at about 1.4 million B/D, output of kerosine jet fuel over the past two months has been at the highest monthly levels ever.

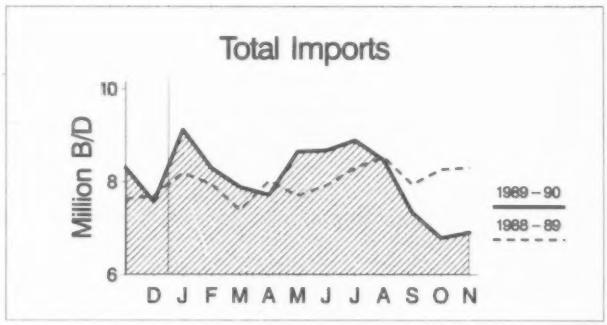
Utilization of reported capacity averaged 84 percent, down 2 percentage points from last November's rate. Capacity in actual operation was utilized at an estimated 87 percent rate, down from near-maximum rates during July through September of 95 to 96 percent.

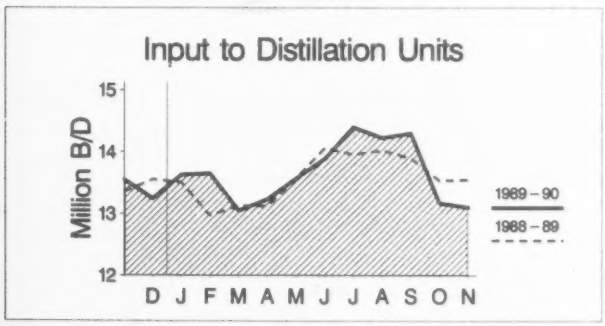
Inventories

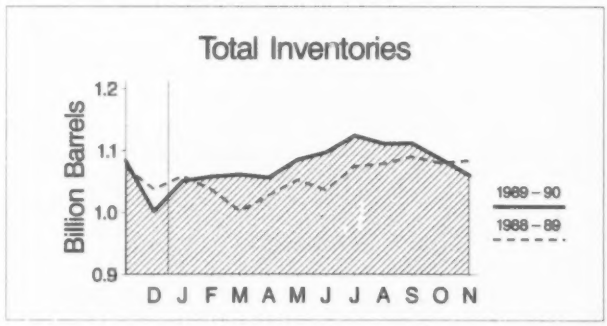
STOCK DRAW CONTINUES. Total inventories continued their downtrend of the last several months. November's drop contributed another 27 million barrels to the decline which has amounted to nearly 65 million barrels, or an average of about 500 thousand B/D, since the end of July. The historical average stock change over that period has been an increase, rather than a decline, of about 200 thousand B/D. Total stocks fell to 1,060 million barrels, a little below the midpoint of the 1,030 to 1,100 million barrel range of recent previous Novembers.

Crude stocks declined 9 million barrels to 335 million barrels, compared with a historical range of about 320 to 365 million barrels. Though distillate stocks' 5 million barrel decline in November was not typical for the month, at 133 million barrels, inventories were still 13 million barrels higher than a year ago. Gasoline stocks were steady at 221 million barrels for the month, about average for November.









1/ Total supply, i.e., production plus imports adjusted for net stock change is equal to total products supplied from primary storage. Total products supplied from primary storage less exports is equal to total domestic products supplied. Information contained in this report is derived from information published in the API Weekly Bulletin and is based on historical analysis of the industry. All data reflect the most current information available to the API and include all previously published revisions.

2/ Includes lease condensate.

3/ API data do not include crude oil imported for the Strategic Petroleum Reserve (SPR) nor crude oil stocks held in the SPR (according to the U.S. Department of Energy, the SPR held approximately 587 million barrels as of November 30, 1990).

ESTIMATED UNITED STATES PETROLEUM BALANCE
(Daily Average in Thousands of 42 Gallon barrels)

Products Supplied/Supply From Primary Storage	NOVEMBER			YEAR-TO-DATE		
	1990[1]	1989[2]	% Change	1990[3R]	1989[2]	% Change
Products Supplied:						
Total motor gasoline	7,121	7,353	(3.2)	7,214	7,320	(1.4)
Finished leaded motor gasoline/*	316	597	(47.1)	399	853	(53.2)
Finished unleaded motor gasoline/*	6,805	6,756	0.7	6,815	6,467	5.4
Naphtha-jet	184	182	1.1	181	205	(11.7)
Kerosine-jet	1,397	1,337	4.5	1,307	1,261	3.6
Distillate fuel oil	3,194	3,311	(3.5)	3,045	3,086	(1.3)
Residual fuel oil	970	1,240	(21.8)	1,217	1,324	(8.1)
All other oils[4]	4,189	4,084	2.6	4,112	4,137	(0.6)
Reclassified[5]	-195	-196	(0.5)	-144	-150	(4.0)
Total domestic products supplied	16,860	17,311	(2.6)	16,932	17,183	(1.5)
Exports	848	975	(13.0)	789	839	(6.0)
Total products supplied	17,708	18,286	(3.2)	17,721	18,022	(1.7)
Supply:						
Domestic production:						
Crude oil[6]	7,082	7,536	(6.0)	7,212	7,639	(5.6)
Natural gas liquids	1,596	1,483	7.6	1,520	1,564	(2.8)
Other supply[7]	1,233	1,099	12.2	1,094	912	20.0
Total domestic supply	9,911	10,118	(2.0)	9,826	10,115	(2.9)
Imports:						
Crude oil, total[8]	5,056	6,131	(17.5)	5,972	5,819	2.6
Canadian	618	594	4.0	634	632	0.3
Other	4,438	5,537	(19.8)	5,338	5,187	2.9
Products, total	1,852	2,170	(14.7)	2,097	2,227	(5.8)
Residual fuel oil	349	543	(35.7)	498	624	(20.2)
Other	1,503	1,627	(7.6)	1,599	1,603	(0.2)
Total imports	6,908	8,301	(16.8)	8,069	8,046	0.3
Total supply	16,819	18,419	(8.7)	17,895	18,161	(1.5)
Stock change, all oils	-889	133	*****	174	139	*****
Refinery Operations						
Input to crude oil distillation units	13,101	13,549	(3.3)	13,656	13,579	0.6
Operable capacity	15,591	15,732	(0.9)	15,556	15,696	(0.9)
Refinery utilization (%)[9]	84.0	86.1	(2.4)	87.8	86.5	1.5
Crude oil runs	12,883	13,420	(4.0)	13,480	13,423	0.4

Stocks (millions bbls.)	1990		1989[2]	% Change from	
	Nov. 31[10]	Oct. 31[10]	Nov. 30	Previous Month	Year Ago
Crude oil[8]	335.1	343.8	351.0	(2.5)	(4.5)
Unfinished oils	108.4	107.5R	111.5	0.8	(2.8
Total motor gasoline/**	221.2	221.1	223.6	0.0	(1.1)
Finished leaded motor gasoline/*	9.7	10.5	18.8	(7.6)	(48.4)
Finished unleaded motor gasoline/*	171.7	171.5	166.3	0.1	3.2
Naphtha-jet	6.5	6.5	6.8	0.0	(4.4)
Kerosine-jet	45.5	45.1	44.4	0.9	2.5
Distillate fuel oil	132.9	138.2	119.8	(3.8)	10.9
Residual fuel oil	51.0	49.7	52.4	2.6	(2.7)
All other oils	159.0	174.4R	174.2	(8.8)	(8.7)
Total all oils	1,059.6	1,086.3R	1,083.7	(2.5)	(2.2)

/1 Based on API estimated data converted to a monthly basis.
/2 Source: U.S. Department of Energy.
/3 January-September, DOE, October-November, API
/4 Includes crude losses.
/5 Beginning with January 1981, U.S. Department of Energy began using a new data collection system which encompasses a method to ascertain the amount of product reclassified during the production phase. So that there will be no double counting of these volumes, they are subtracted from the total domestic products supplied.
/6 API estimate; includes lease condensate.
/7 Includes Unaccounted-for crude oil, Processing gain and Field Production of other hydrocarbons and alcohol.
/8 Data do not include oil imported for the Strategic Petroleum Reserve (SPR) nor crude oil stocks held in the SPR.
/9 Represents "Input to crude oil distillation units" as a percent of "Operable capacity".
/10 Derived by interpolating API weekly stocks data.
/R Revised.
/* Included in motor gasoline.
/** Includes finished leaded, finished unleaded, and motor gasoline blending components stocks.